

REMARKS

This application has been reviewed in light of the Office Action dated February 10, 2006. Claims 1-26 and 28-54 are pending, with Claims 1, 52, and 53 in independent form. Claim 7 has been amended as to matters of form to correct its dependency so that proper antecedent basis exists for the phrase "highlighting attribute." Claim 28 has been amended to depend from Claim 23 instead of Claim 27, which was previously cancelled without prejudice or disclaimer of the subject matter presented therein. No other changes to the claims have been made by this amendment. Favorable reconsideration is requested.

As an initial matter, Applicants respectfully request withdrawal of the Office Action's final denial of priority from the provisional application for certain of the dependent claims. Applicants inadvertently omitted a response to this issue in their response filed October 26, 2005 and respectfully submit that such response was a bona fide attempt to advance prosecution according to 37 C.F.R. 1.135(c) and as set forth by MPEP 714.03. In the event that the Examiner declines to withdraw finality of this denial of priority, Applicants respectfully request that this paper be considered a Petition to the Director's Supervisory Authority under 37 C.F.R. 1.181(a)(3) for withdrawal of such finality. The Commissioner is authorized to charge any fees associated with such a Petition to Deposit Account No. 05-0225. A duplicate of this paper is enclosed.

The Office Action dated June 28, 2005 at pages 2-3 alleges that the provisional application, upon which priority is claimed, fails to provide adequate support under 35 U.S.C. §112 for Claims 3, 7, 9, 11, 12, 14, 18, 19, 21, 23-33, 37, 41-43, 46-48, and 51. In particular, such Office Action alleges that the provisional application lacks any mention of color, page or graphic description languages, or several others of the dependent claim limitations. Applicants respectfully traverse this position for at least the following reasons. (It should be noted, that in the course of the following discussion regarding the provisional application, that the Claims are not limited to the embodiments described therein, which are referred to for purposes of illustration only.)

Support for Claims 3, 7, 9, 11, 12, 14, 18, 21, 23-33, and 37 may be found in the provisional application at least at the last two paragraphs of page 3. In particular, these paragraphs describe that selection data 104 and base graphic data 102 are rasterized to generate two sets of rasters. Later, this portion

of the provisional application describes that each of the rasters have values: “values in the second set of rasters are said to be a function of the values of the first set of rasters. As an example, those values that are to cause visual cues when displayed may be values which invert colors. If a value is inverted twice, it is restored to its initial state.” 35 U.S.C. §112, first paragraph, requires that “the specification...contain a written description of the invention, and... the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains...to make and use the same....” The above-cited portion of the provisional application describes that raster images contain values which describe colors to be printed or not printed by a printer, or colors to be displayed or not displayed by a display device.

Applicants respectfully submit that one skilled in the art would appreciate that these values in raster data, or any other graphic data, could be described as an “attribute”. In other words, one skilled in the art, when implementing or interpreting raster data, would know that the phrase “color values” is equivalent with “color attributes.” To the extent that the Office Action implies that the provisional application needs to provide explicit use of phrases, such as “highlighting attribute” instead of “value”, Applicants respectfully disagree and submit that 35 U.S.C. §112 includes no such requirement. In addition, because the specification describes the use of highlighting objects in raster data, and in particular, binary raster data, Applicants submit that one skilled in the art would appreciate that a highlighted value or “attribute” would be the opposite of a non-highlighted attribute. Accordingly, the provisional is respectfully submitted to provide support for at least two color values or “attributes”. Claim 8, for example, chooses the phrase “highlighting attribute” for one color value and Claim 9, for example, chooses the phrase “blank attribute” for another color value. (It should be noted that the claims are not limited to any particular number or types of attributes and are not limited to the use of binary raster data.) As stated before, Applicants submit that §112 does not require that exact terminology be used to provide support.

Further, the above-cited portion of the provisional application specifies that when the selection objects are composited with the base graphic data, such color values may be inverted (i.e., altered) (see, e.g. Claim 11). Applicants respectfully submit that those of ordinary skill in this art would know

that the combining of selection object rasters with original graphic data would require the altering of values of pixels from the base graphic raster which correspond to pixels of the selection graphic raster having highlighting values. (see, e.g., Claim 21).

In regard to Claims 19, 46-48, and 51, support can be found in the provisional application at least with regard to FIG. 2, which shows the outlining of objects in reference numeral 202 and the subsequent replacing of selected graphic objects with a shape bounded by an outline in reference numeral 208. (See, e.g., Claim 19) Regarding Claim 51, support may be found in the provisional application at least at the last three lines of the second paragraph on page 4, which specifies that the raster block 204, which represents the selection object graph rasters may be of any size sufficient to hold the selection rasters and corresponding information. Accordingly, Applicants respectfully submit that one skilled in the art would know, based upon this information that the base graphic raster may have a different resolution than the selection graphic raster (e.g., raster block 204).

For at least the above-discussed reasons, Applicants respectfully submit that the provisional application supports, according to 35 U.S.C. §112, all of the claims of the present application. Therefore, withdrawal of the denial of priority from the provisional application is respectfully requested. Applicants respectfully reserve the right to appeal this issue to the Board of Patent Appeals and Interferences as it pertains to the fulfilling of a statutory requirement.

The Office Action includes a rejection of Claim 28 under 35 U.S.C. §112, second paragraph. In particular, such Claim depends from a cancelled claim. In response, Applicants have amended Claim 28 to depend from Claim 23 instead of previously cancelled Claim 27. Accordingly, withdrawal of this rejection is respectfully requested.

The Office Action also includes rejections of all of the pending claims under 35 U.S.C. §103(a) as allegedly unpatentable over U.S. Patent No. 6,337,700 (Kinoe, et al.). In view of U.S. Patent No. 5,276,786 (Long, et al.) and at times in view of U.S. Patent No. 4,958,146 (Priem, et al.) or other references. Applicants respectfully traverse these rejections for at least the following reasons.

Claim 1 requires a computer-implemented method for highlighting a selected object on a display. The method including rasterizing base graphic data

to provide a base graphic raster. The base graphic raster includes at least one graphic object including a selected graphic object to be highlighted. The method also includes providing selection graphic data including a graphic object corresponding to the selected graphic object; rasterizing the selection graphic data to yield a selection graphic raster; and, compositing the base graphic raster and the selection graphic raster to yield an output graphic raster for display.

Important aspects of Claim 1 include that the selection graphic data is provided in a non-rasterized format and that the selection graphic data and the base graphic data are separately rasterized. In particular, Claim 1 requires providing selection graphic data and then subsequently rasterizing the selection graphic data. Because Claim 1 requires that the selection graphic data be rasterized after it is provided, Applicants submit that Claim 1, therefore, requires that the selection graphic data be provided in a form other than a rasterized form. This interpretation of Claim 1 is consistent with the specification which describes embodiments of an invention focused on using, for example, a vector representation of an object to assist in locate such object in raster data, thereby allowing the object to be easily highlighted in the raster data. See paragraph [0047] of the specification. (It is to be understood, of course, that the scope of Claim 1 is not limited to the details of these embodiments, which are referred to for purposes of illustration only. In particular, Claim 1 is not limited to using vector representations, and only requires that the selection graphic data be provided in a non-rasterized form.) As discussed at paragraph [0008] of the specification, the inventors indicate that it is much easier to identify objects using a vector representation than using a raster representation. Accordingly, it is an important aspect of the present invention that the selection graphic data be provided in a non-rasterized format to assist in locating the selected graphic object. By having the selection graphic data provided in a non-rasterized format separately from the base graphic data, the present invention allows the base graphic data and the selection graphic data to be separately rasterized. By having the selection graphic data rasterized separately, the yielded selection graphic raster is used to identify the specific pixels involved in the selected graphic object, thereby allowing the selected graphic object to be easily identified in the base graphic raster by compositing the base graphic raster and the selection graphic raster. See Claim 1.

In the Long, et al. patent, a first image store 17 retains an image ultimately displayed on monitor 15 via a display/refresh store 16 and the processor 18. See column 4, lines 32-44. When special effects are desired to be applied to the image in the first image store 17, an operator may zoom in on a particular region of the image in the first image store 17 to which the operator desires to apply these special effects. See column 4, lines 53-60; and column 5, lines 27-47. Once the zoomed in area (or ‘selected area’) has been identified by the operator it is transferred to a second image store 25. Once the selected area is in the second image store 25, the user can manipulate by performing for example, airbrushing, chalking, or painting that region. After the selected area has been modified, it is combined with the original image data in the first image store 17. See column 5, lines 47-14.

Applicants have not found any disclosure in the Long, et al. patent that describes the format of the data in the stores 16, 17, 25. However, if the data in store 17 is already rasterized, for argument’s sake, the copying of selected data to store 25 does not meet the claimed limitation of “providing selection graphic data including a graphic object corresponding to the selected graphic object” in Claim 1, because Claim 1 requires that such selection graphic data be subsequently rasterized separate from the base graphic data. If this interpretation of Long, et al. were correct, for argument’s sake, the already-rasterized data in store 17 would be copied to the store 25 in rasterized form. Accordingly, no providing of selected graphic data in non-rasterized form would be taught by the Long, et al. patent. On the other hand, for argument’s sake, if the data in store 17 was not in a rasterized format, Applicants submit that the only logical place where rasterization would occur would be by processor 18 prior to display on the monitor 15. If this were the case, for arguments sake, non-rasterized data in store 17 would be copied to and manipulated in store 25, recombined with the non-rasterized data in store 17, transmitted to processor 18 in non-rasterized format, rasterized by the processor 18, and then transmitted to monitor 15 for display. Stated differently, in the event that the data in stores 17 and 25 were not rasterized, the processor 18 would rasterize the already-combined data prior to sending the data to monitor 15 for display. Accordingly, there would be no separate rasterizing of selection graphic data and base graphic data, as required by Claim 1.

Applicants have not found a logical way or reason to modify the Long, et al. patent to perform separate rasterizations of base graphic data and selection graphic data and to provide selection graphic data in a non-rasterized form as required by Claim 1. Applicants submit that this is the case because the Long, et al. patent is not constructed to identify objects in raster data to be highlighted, as is the case with the present invention. Highlighting is performed manually by an operator in the Long, et al. patent, and therefore, the Long, et al. patent need not be concerned with ways to identify objects in raster data for highlighting.

In regard to the Kinoe, et al. patent, Applicants have not found any teaching or suggestion regarding the use of rasterized vs. non-rasterized formats for selection graphic data, or the separate rasterization of base graphic data and selection graphic data, as required by Claim 1. To elaborate, Applicants understand the Kinoe, et al. patent to pertain to a three-dimensional object rendering software program that allows a user to efficiently isolate, or highlight, an object within a three-dimensional structure. See column 2, lines 42-53. The Kinoe, et al. patent is understood to describe a sequence of mouse controls that allow the operator to identify a particular object within a complex three-dimensional structure. In particular, an operator clicks a mouse button to initiate display of a tablet. When the tablet is displayed, a horizontal movement of the mouse moves a reference plane essentially towards and away from the three-dimensional structure. Any objects that are located in front of the reference plane are highlighted, or displayed in a translucent manner, thereby allowing the operator to see parts underneath the translucent objects. When the operator has the reference plane at a desirable location, the user may again perform a mouse click to move into another data processing state. In this second state, a vertical movement of the mouse allows the operator to select other objects in a group associated with a selected object. The selected group of objects also are ‘highlighted’ to allow objects underneath them to be viewed. The vertical mouse motions change the number of objects in the selected group. See column 12, lines 10-29, and column 16, line 25, through column 17, line 2. A further mouse click after the operator has selected the desired group of objects causes all of the objects in the group to disappear, thereby allowing the user to directly view the selected part. In other words, all of the mouse manipulations performed by the

operator are performed to strip away objects in a three-dimensional structure so that interior objects can be viewed. The operator may then zoom in and repeat the process to select other objects located further within the three-dimensional structure. Accordingly, the Kinoe, et al. patent appears to be silent regarding providing selection graphic data in a non-rasterized format and then subsequently rasterizing the selection graphic data to form a selection graphic raster, which is then composited with a base graphic raster to form an output graphic raster as required by Claim 1.

For at least the above discussed reasons, the Long, et al. patent and the Kinoe, et al. patent are respectfully submitted not to separately teach all of the features of Claim 1. In regard to combining the Kinoe, et al. patent and the Long, et al. patent, the Office Action states that the Kinoe, et al. patent does not expressly teach the existence of a separate selection graphics raster and then its recombination with an originally present image. See the middle paragraph on page 7 of the Office Action. The Office Action then refers to the Long, et al. patent to teach this feature. The Office Action states, in particular, that “it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Kinoe to move the object to a separate data store or selection raster, modify it, and then copy it back, since this operation saves memory bandwidth and is known to be more efficient.” See the bottom paragraph on page 8 of the Office Action. Even if this were the case, Applicants respectfully submit that there is still no teaching in either the Kinoe, et al. patent or the Long, et al. patent regarding the specific order of rasterization performed, and the specific manner of rasterization performed by Claim 1. In particular, Claim 1 requires that selection graphic data be provided in a non-rasterized format, and that the selection graphic data and base graphic data be rasterized separately and then subsequently combined. The Kinoe, et al. patent appears to be silent on these matters, as well as the Long, et al. patent. Accordingly, even if the Kinoe, et al. patent were modified such that its highlighted objects were to be separately processed in a different data store, like the Long, et al. patent discloses, the Kinoe, et al. patent still would not teach or suggest that selection graphic data is provided in a non-rasterized format, that the selection graphic data and base graphic data are separately rasterized, and that the base graphic raster and the selection graphic raster are thereafter combined to generate an output. For at least these reasons,

Applicants respectfully submit that Claim 1 is patentable over the Long, et al. patent and the Kinoe, et al. patent, taken separately or in any proper combination.

Independent Claims 52 and 53 include the same or similar features to that described above in connection with Claim 1, and are believed to be patentable for at least the same reasons. In addition, the other rejected claims depend from one of the independent claims discussed above, and are believed to be patentable for at least the same reasons. Since each dependent claim is deemed to define an additional aspect of the invention, individual reconsideration of the patentability of each claim on its own merits is respectfully requested.

In view of the foregoing amendments and remarks, Applicants respectfully request favorable reconsideration and the allowance of the present application.

Respectfully submitted,



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If the Examiner is unable to reach the Applicant(s) Attorney at the telephone number provided, the Examiner is requested to communicate with Eastman Kodak Company Patent Operations at (585) 477-4656.